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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/622,243	07/18/2003	Shingo Hamada	04536.017001	3128
22511	7590	07/07/2004	EXAMINER	
OSHA & MAY L.L.P. 1221 MCKINNEY STREET HOUSTON, TX 77010			SEVER, ANDREW T	
			ART UNIT	PAPER NUMBER
			2851	

DATE MAILED: 07/07/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/622,243

Applicant(s)

HAMADA, SHINGO

Examiner

Andrew T Sever

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-6 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1 is/are allowed.
- 6) ☒ Claim(s) 2, 5 and 6 is/are rejected.
- 7) ☒ Claim(s) 3 and 4 is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 18 July 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
- 1) ☒ Certified copies of the priority documents have been received.
 - 2) ☐ Certified copies of the priority documents have been received in Application No. ____.
 - 3) ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Rodney Fuller
Primary Examiner

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 7/2003, 3/2004.

- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: ____.

DETAILED ACTION

Specification

1. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claim 2 is rejected under 35 U.S.C. 102(b) as being anticipated by Katagiri (US 4,154,510)

Katagiri teaches in figure 1 a projector for projecting a picture on a surface to be projected, comprising:

A lens unit (3,1, 4, and 5) for projecting a picture; and

A cylindrical focus ring (7) inserted along a direction in which an optical axis of said lens unit extends, and attached in such a manner as to surround an outer periphery of said lens unit in a circumferential direction, wherein

One portion of one of said focus ring and said lens unit is sandwiched between another portions of one of said focus ring and said lens unit (the threading would require parts of 7 and 3 to be sandwiched between each other at 7a and 3e) and, also, said one portion is engaged with said another portions along said optical axis, whereby said focus ring is fixed to said lens unit.

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claim 5 is rejected under 35 U.S.C. 103(a) as being unpatentable over Katagiri as applied to claim 2 above.

As described in more detail above Katagiri teaches a projector for projecting a picture on a surface, which among other things comprises a lens unit having a cylindrical focus ring, attached in such a manner as to surround an outer periphery of the lens unit in a circumferential direction. Katagiri does not necessarily teach that the focus ring is molded with resin, only teaching that that the lens unit is made of resin in column 2 lines 40-46, however it is well known to make all the parts of the projection lens unit (including the focus ring) of resin as is acknowledged by the applicant on page 1 line 20 of applicant's specification and as is further evidenced by Hirata et al. (US 6,573,950) in column 25 lines 35-39. Accordingly it would be obvious to one of ordinary skill in the art at the time the invention was made to make the focus ring of Katagiri of resin.

6. Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Katagiri as applied to claim 5 above and further in view of Fujimori et al. (US 6,536,906.)

As described in more detail above Katagiri teaches a projector for projecting a picture on a surface, which among other things comprises a lens unit having a cylindrical

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focus ring, attached in such a manner as to surround an outer periphery of the lens unit in a circumferential direction. Further as taught above it is well known to make the focus ring with resin, however Katagiri does not teach the use of heat-resistant resin.

The use of heat-resistant resin in components of the housing of various parts of a projector is well known as taught by Fujimori in column 9 lines 12-29 it is useful to use a heat resistant resin in order to dissipate heat, which as is well known in the optical arts can cause aberrations in the optical components including lenses. Accordingly it would be obvious to one of ordinary skill in the art at the time the invention was made to use a heat resistant resin in the focus ring.

Allowable Subject Matter

7. Claim 1 is allowed.
8. Claims 3 and 4 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
9. The following is a statement of reasons for the indication of allowable subject matter: Claims 1 and 3 claim among other things first and second ribs that have a specific orientation with respect to the optical axis. They also claim a pair of protrusion parts with a spacing also having a specific orientation with respect to the optical axis. This structure is shown in figure 4

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of applicant's drawings. This was not found in the prior art and accordingly claim 1 is allowed and claim 3 would be allowable if re-written in independent form including the subject matter of the rejected base claim (claim 2). Claim 4 is allowable due to its dependency on claim 3 and would be allowable if re-written in independent form including the subject matter of claim 3 and 2 or if claim 3 was re-written in independent form as just described.

Conclusion

10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

US 5,737,119 to Mladjan et al. Figure 4 teaches an assembly of a focus ring.

US 6,364,491 to Okada et al. figure 12 teaches a focus ring assembly structure.

US 5,940,228 to Burnett teaches another assembly structure in figure 2.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Andrew T Sever whose telephone number is 571-272-2128. The examiner can normally be reached on 8:30-5:00.

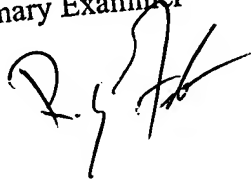
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edward Lefkowitz can be reached on 271-272-2180. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

AS

Rodney Fuller
Primary Examiner

A handwritten signature in black ink, appearing to be 'R. Fuller', written over the printed name of the Primary Examiner.